What Has The Demonstration Done?
Should It Be Continued?

REPORT OF THE

COMMITTEE ON APPRAISAL

FOR THE

FRAMINGHAM COMMUNITY HEALTH AND TUBERCULOSIS DEMONSTRATION

COMMUNITY HEALTH STATION
FRAMINGHAM, MASS.
OCTOBER, 1919

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FRAMINGHAM COMMUNITY HEALTH AND TUBERCULOSIS DEMONSTRATION

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*Prof. C.-E. A. Winslow, *Secretary*	Yale University, New Haven, Conn.
Dr. Edgar T. Sydenstricker	U. S. Public Health Service.
Dr. Charles V. Chapin	Health Commissioner, Providence, R. I.
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Miss Helen R. Stewart	National Public Health Nursing Association.
Mr. George J. Nelbach	State Charities Aid Association, New York.
Dr. Emery R. Hayhurst	State Department of Health, Ohio.
Dr. Thomas A. Storey	American School Hygiene Association.
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Dr. Louis Hamman	Johns Hopkins Medical School.
Dr. Lawrason Brown	Trudeau Sanatorium, Saranac Lake, N. Y.
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Mr. Theo F. Rice	Framingham, Mass.

EXECUTIVE STAFF

Donald B. Armstrong, M.D., *Executive Officer*
P. Challis Bartlett, M.D., *Chief Medical Examiner*

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*Professor Winslow has recently accepted an appointment on the National Committee.

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FOREWORD

On May 3, 1916, the conception of a community tuberculosis experiment was first outlined in a letter received by the National Tuberculosis Association from Dr. Lee K. Frankel, Third Vice-President of the Metropolitan Life Insurance Company. In this communication Dr. Frankel discussed tuberculosis work in general, and stated that, in his belief, much might be accomplished toward the eradication of tuberculosis through an intensive experiment aimed at the control of this disease. In offering the financial aid of the Metropolitan Life Insurance Company in such an experiment Dr. Frankel stated:

"To this end we are prepared to place at the disposal of the National Association for the Study and Prevention of Tuberculosis the sum of one hundred thousand dollars ($100,000.) for the purpose of conducting a community experiment over a period of three years in the control of tuberculosis."

In outlining the fundamentals of such an experiment and demonstration Dr. Frankel indicated that stress should be placed upon periodic medical examinations for all members of the community, medical and nursing care for all tuberculosis cases, adequate dispensary and institutional treatment, the coöperation of local and state agencies, etc.

This offer was accepted immediately by the National Tuberculosis Association, and the energies of that association have been devoted to the direction of the experiment since its actual initiation on January 1, 1917. Previous to that date considerable time was spent in the selection of an appropriate community, Framingham, Mass. being finally chosen for the work.

As indicated above, the Framingham Community Health and Tuberculosis Demonstration was originally planned for a three-year period. On this basis the Demonstration would have ended on January 1, 1920. In view of the fact that many phases of the program would inevitably have been unfinished on that date, the National Tuberculosis Association took steps through the National Committee in charge of the Framingham work, during the summer of 1919, to meet the following points of inquiry:

1. How much has the Experiment or Demonstration accomplished thus far?

2. In what measure has the work approached an answer to the problem originally set, as reflected by the essentials briefly referred to above?

3. Would an extension of time for the Demonstration be justifiable?

Two principal methods were used to answer these inquiries. The first was the appointment of a Progress Committee, serving as a Sub-Committee

of the National Committee, to study these problems, and to report their findings to the National Tuberculosis Association. The second was the creation of an outside Appraisal Committee, to render an impartial judgment upon these fundamental questions.

Through the coöperation of Surgeon General Rupert Blue of the United States Public Health Service, such an Appraisal Committee was appointed, to make an unprejudiced and scientific analysis of the Framingham work. The members of this Committee have visited Framingham, two formal committee meetings have been held, and the report of the committee, as submitted to Surgeon General Blue, follows in this publication.

After approval by the Appraisal Committee, this report was passed upon by Surgeon General Rupert Blue, by the Progress Committee on the Framingham work, by the National Committee in charge of the Demonstration, by the Executive Committee of the National Tuberculosis Association, and finally by the Board of Directors of the Metropolitan Life Insurance Company, with the result that the Appraisal Committee recommendations and general plan for the extension were approved, with only minor changes as to budget suggestions, and an additional appropriation made by the Metropolitan Life Insurance Company to carry on the work for the year 1920.

The Health Demonstration staff wishes to take this opportunity, both for itself and for the National Tuberculosis Association, to extend its appreciation and thanks to the Appraisal Committee for their thorough and imaginative approach to the problem and for their invaluable suggestions. The Demonstration officers are particularly grateful for the work of Professor C.-E. A. Winslow as Secretary of the Committee, to whose broad knowledge and keen analytical vision, the excellence of the report is in great measure due.

SUMMARY OF CONCLUSIONS AND RECOMMENDATIONS

Surgeon General Rupert Blue,
U. S. Public Health Service,
Washington, D. C.

1. Your committee feels that the work of the Framingham Community Health and Tuberculosis Demonstration during the past three years is worthy of high praise. It has organized and carried out a community plan for the control of tuberculosis along the lines indicated by the best modern scientific knowledge. It has given us the first reliable information as to the actual amount of tuberculosis present in a typical American community; and in the organization of a tuberculosis consultation service it has made a contribution of the first magnitude to the machinery of public health protection. In addition, it has stimulated the development of the general public health campaign in Framingham to a degree that goes far to realize the highest ideals of modern sanitary science.

2. The Demonstration has not furnished an answer to the primary question as to the practicability of the control of tuberculosis, because the period of three years was necessarily too short to make a conclusive answer to this question possible. The results thus far obtained are as promising as could be expected, but *an extension of the work for a period of five years more will be necessary* in order to insure with reasonable certainty a satisfactory answer to this question.

3. Your committee, therefore, recommend that *a further appropriation of* $100,000.00 should, if possible, be obtained for the continuance of the Demonstration experiment along the general lines indicated in the body of its report.

Committee on Appraisal:

ALLAN J. MCLAUGHLIN, *Chairman,*

LAWRASON BROWN,
CHARLES V. CHAPIN,
S. MCC. HAMILL,
LOUIS HAMMAN,
EMERY R. HAYHURST,
VICTOR G. HEISER,
H. R. M. LANDIS,
GEORGE J. NELBACH,
HELENA R. STEWART,
THOMAS A. STOREY,
EDGAR T. SYDENSTRICKER,
C.-E. A. WINSLOW, *Secretary.*

KEY-NOTE SENTENCES

As To Results:

1. *The Extent of Tuberculosis.*

The first step, a determination of the actual prevalence of tuberculosis infection, has been accomplished with a high degree of success, giving us for the first time a fairly complete picture of the amount of tuberculosis actually existing in a typical American community.

2. *The Consultation Service.*

The most important of all the practical contributions made by the Demonstration is the working out of a plan for medical consultation service, which is clearly the most promising means yet devised for securing a reasonably complete knowledge of the amount of tuberculosis existing in a given community. The consultation service plan has attracted wide attention throughout the country.

3. *Tuberculosis Treatment.*

The machinery adopted for the treatment of cases of tuberculosis after they have been discovered has been modelled along generally accepted lines. The work has been accomplished efficiently and successfully.

4. *Standards of Diagnosis.*

The officers of the Demonstration have prepared a scheme of diagnostic standards for tuberculosis which has attracted wide attention.

5. *Death Certification Analysis.*

The careful analysis of death certificates, showing that the actual deaths from tuberculosis in Framingham were 22 per cent. in excess of the reported deaths from this disease, also constitutes a valuable contribution.

6. *Sanitary Studies.*

From the standpoint of general environmental causes effecting the spread and development of tuberculosis, the staff of the Demonstration has conducted valuable studies of schools, factories, and municipal health conditions.

7. *General Sickness Prevalence.*

The medical examination drives have yielded some of the most complete data in regard to the prevalence of disease of all sorts in a random section of the population that have ever been collected in this country.

8. *The Tuberculosis Death Rate.*

From the standpoint of mortality, the tuberculosis death rate has fallen from 93 per 100,000 in 1917 to a rate corresponding to 76 for the first five months of 1919. This is an encouraging showing, in view of the fact that the tuberculosis death rate in similar Massachusetts communities, has in general materially increased.

As To Framingham:

9. *The Town's Response.*

The town of Framingham has responded with vision and effectiveness to the remarkable opportunities offered by the establishment of the Demonstration. The local Board of Health, the School Committee, the Civic League, and many of the employers of labor, have met the challenge to make Framingham the model "Health Town" with constructive responses of a high order.

10. *Local Health Development.*

Even more important from the practical standpoint has been the notable development of public health work in Framingham along a wide variety of lines.

11. *The Health and School Departments.*

The local health department has grown to be a strong and effective one, and the system of medical inspection of school children, organized under the Department of Education, represents one of the best examples of such service to be found in the United States.

12. *The Community Benefited.*

It seems clear that if the Framingham Demonstration should cease on January 1, 1920, the local community will have benefited materially and many important contributions will have been made to the practical control of tuberculosis.

13. *Need for Local Coördination.*

It seems to us if the Demonstration is to be continued that it might be of service to organize in Framingham a Health Council which would include the

Health Officer, or a Board of Health representative as Chairman, with representatives of the School Committee, the Civic League, the Framingham Hospital, the Red Cross, the medical society, and the Demonstration,—this council to serve as a clearing-house for the coördination of health activities and the planning of the most effective public health machinery for the community as a whole. We deem it to be of great importance to transfer the work to them (the local agencies) as rapidly as possible.

In General:

14. *The Foundations Laid.*

The foundation has been well laid; a program for the control of tuberculosis by early diagnosis and hygienic care has been organized on ideal lines; local sentiment both in the medical and lay circles has been successfully developed in support of the campaign; and all conditions are favorable to its success.

15. *Continuation Vital.*

These statistical calculations have led us to the conclusion that the Framingham Demonstration should be continued for a period of at least five years in order to render the attainment of definite results of reasonable certainty. It would furnish for the first time a definitely established working program for the practical control of tuberculosis.

16. *Appreciation.*

We desire to express our warm appreciation of the many courtesies extended to us by the staff, and the opportunities offered to form a sound judgment as to the character of the work, through conference with local individuals and agencies, both inside and outside the Demonstration circle.

Report of Committee on Appraisal

FOR THE

Framingham Community Health and Tuberculosis Demonstration

Surgeon General Rupert Blue,
U. S. Public Health Service,
Washington, D. C.

DEAR GENERAL BLUE:—

1. *Introduction.*

The Committee on Appraisal for the Framingham Community Health and Tuberculosis Demonstration was appointed by you last May to investigate the work that has been done in Framingham under the direction of the National Tuberculosis Association, and to report upon the results so far attained and the desirability of continuing the work beyond the three years originally planned.

PURPOSE OF THE DEMONSTRATION

The purpose of the Framingham Demonstration, as we understand it, was to apply the most complete program for the control of tuberculosis indicated by present scientific knowledge, with the view to determine whether and in what degree it is possible with the information at our disposal to obtain definite and tangible results from such a campaign.

Your committee has held two formal meetings, at Atlantic City on June 8th, and at Framingham on August 14th, and between these dates most of the members of the committee have visited Framingham and made a personal study of the work on the ground, while full and extensive documentary data in regard to the Demonstration have been furnished us by Dr. D. B. Armstrong, its Executive Officer. We desire at this point to express our warm appreciation of the many courtesies extended to us by Dr. Armstrong and his staff, and the opportunities offered to form a sound judgment as to the character of the work, through conference with local individuals and agencies both inside and outside the Demonstration circle.

2. *General Impressions of the Framingham Community Health and Tuberculosis Demonstration.*

The officers in charge of the Demonstration have accepted what appears at present the soundest current viewpoint, that the most effective practical procedure for the control of tuberculosis lies in the development of machinery for its early detection and for the hygienic care of individuals affected or threatened with the disease,—while at the same time taking such opportunities as offer to minimize the spread of the infectious agent. The first step along this line must be a determination of the actual prevalence of tuberculous infection, and this end has been accomplished with a high degree of success by the organization of medical examination drives, by the organization of a tuberculosis consultation service, and by the establishment of infant, school, industrial and other clinics. Efforts along this line have been strikingly successful in giving us for the first time a fairly complete picture of the amount of tuberculosis actually existing in a typical American community.

THE EXTENT OF TUBERCULOSIS DETERMINED

The conclusion that in the medical examination drives nearly one per cent. of the persons examined were suffering from active tuberculosis while somewhat over one per cent. more were arrested cases, is an important one. This finding, if assumed to be representative of the whole community and compared with the death rate for the town, would indicate a ratio of 9 or 10 active cases during the year to one reported death. The best way to estimate this factor would in our judgment be to compare the number of active cases under observation during a given year with the number of deaths occurring among that group of cases. The actual experience of the Demonstration has been that two hospital beds have been required for each reported death; but the period is too short and the number too small to warrant far-reaching deductions. Furthermore, it should be noted that it would have been difficult to fill this indicated ratio of beds without the effective machinery for locating cases, at the disposal of the Demonstration. On a basis of the active advanced cases in which the need for hospitalization was most acute, the ratio indicated by the Framingham experience would be nearer one bed to each reported case. The careful analysis of death certificates showing that the actual deaths from tuberculosis in Framingham were 22 per cent. in excess of the reported deaths from this disease also constitutes a valuable contribution, although the small number of cases involved makes it impossible to apply this conclusion in any general way.

NINE ACTIVE CASES FOR ONE DEATH

In connection with the problem of diagnosis, the officers of the Demonstration have prepared a scheme of diagnostic standards for tuberculosis which has attracted wide attention.

THE CONSULTATION SERVICE AN IMPORTANT CONTRIBUTION

The most important of all the practical contributions made by the Demonstration is the working out of a plan for medical consultation service which is clearly the most promising means yet devised for securing a reason-

ably complete knowledge of the amount of tuberculosis existing in a given community. This work has been carried on by Dr. P. C. Bartlett with admirable scientific skill and exceptional tact and judgment. The physicians of the community almost without exception avail themselves freely of this service and aside from the direct results in the detection of early and doubtful cases, the stimulating effect upon the local medical profession constitutes an invaluable service to the cause of public health in Framingham. The consultation service plan has attracted wide attention throughout the country and under the auspices of the State Department of Health and the State Tuberculosis League such a service has been offered for three months in the Cape Cod district of Massachusetts with great success. The plan is already in operation, or is proposed, in sections of Illinois, New York, Ohio, Oklahoma, Vermont and Wisconsin.

The success of this organized campaign for the discovery of tuberculosis is indicated by the fact that nearly 200 cases are now under observation in Framingham as compared with 27 at the beginning of the Demonstration, and it is particularly encouraging to note that during the first year 42 per cent. of the new reported cases were of an advanced type, while in the second year only 16 per cent. of the cases were advanced, and in the first five months of 1919 only 23 per cent.

DECREASE IN ADVANCED CASES

The machinery adopted for the treatment of cases of tuberculosis after they have been discovered has been modelled along generally accepted lines, involving sanatorium treatment, or hygienic advice furnished through the service of a public health nurse, as circumstances may dictate in the individual case. There has been nothing here that is particularly novel, but the work has been accomplished efficiently and successfully along the lines indicated by the best current practice.

TREATMENT EFFICIENT

In view of the great difficulty of securing adequate sanitary control under such home conditions as are frequently met with, particularly in the later stages of the disease, we desire to emphasize the importance of extending facilities for local hospital treatment. It is our opinion that such treatment can be applied most effectively by the development of hospital facilities within convenient street car radius of the homes of the patients.

From the standpoint of the general environmental causes effecting the spread and development of tuberculosis, the staff of the Demonstration has conducted valuable studies of schools, factories, and municipal health conditions, and the general situation as it affects tuberculosis seems to be as satisfactory as could reasonably be expected. Only two important points which directly concern the control of tuberculosis appear so far not to have been covered,—the establishment of a central pasteurizing station for the milk supply of the community and the organization of a comprehensive system of industrial clinics for the smaller manufacturing plants. Both of these measures have been contemplated by the officers of the Demonstration, and it seems to us most important that these two gaps should be filled.

VALUABLE SANITARY SURVEYS

SIGNIFICANT DATA ON GENERAL SICKNESS

Believing that the control of tuberculosis is closely connected with all conditions which tend to build up the health of the community, the officers of the Demonstration have devoted a considerable share of their attention to the formulation of a general health program beyond the specific field of tuberculosis itself. The medical examination drives have yielded some of the most complete data in regard to the prevalence of disease of all sorts in a random section of the population that have ever been collected in this country. These data are of much value as indicating the prevalence of such conditions and the unit costs involved in such examinations. Even more important from the practical standpoint has been the notable development of public health work in Framingham along a wide variety of lines, which has resulted directly or indirectly from the activities of the Demonstration. The amount of money spent for health protection in Framingham has been increased during the life of the Demonstration from 39c. to $2.00 per capita. Half of the latter sum is contributed from public sources by the Department of Health and the Department of Education, and the other half from private sources through the Civic League, and the industrial clinics established by public-spirited manufacturers. The local Health Department has grown to be a strong and effective one and the system of medical inspection of school children organized under the Department of Education represents one of the best examples of such service to be found in the United States. Machinery for protecting the health of infants and children of the pre-school age has been worked out under the auspices of the Civic League, and with the advances made during the present summer includes four infant clinics, and a pre-school clinic. On the whole, this work seems somewhat less satisfactory than the other phases of the local health movement, but a foundation has been laid upon which progress will no doubt be made in the future.

NOTABLE DEVELOPMENT OF LOCAL HEALTH ACTIVITIES

The work of the Demonstration has been extended in certain directions somewhat beyond the field of definite public health activity, and the Committee on Appraisal feels that such appropriations as those made for the Community House of the Civic League and for the maintenance of the Day Camp for subnormal children might well be discontinued in the near future. Valuable as these enterprises are, it seems to us unlikely that they will yield tangible results in the saving of life.

3. *Conclusions to be Drawn from the Demonstration in Regard to the Practicability of the Control of Tuberculosis.*

The object of the gift made by the Metropolitan Life Insurance Company to the National Tuberculosis Association was not as we understand it, primarily to benefit Framingham or any other local community, but to determine the practicability of the control of tuberculosis by the full application of the best known methods. The really important question before your committee is not, therefore, the extent to which Framingham has benefited by the

development of an admirable scheme of local health organization, but the degree to which this organization has been effective in controlling tuberculosis. Success along this line might obviously be measured in two ways, by a decrease in new cases, or by a decrease in the tuberculosis mortality. With the progress of the Demonstration and the improvement of machinery for finding early cases, the recorded morbidity at first materially increased, but it is interesting to notice that during the first five months of 1919 only 40 new cases came to light, as against 55 new cases for the corresponding months of 1918. Obviously, however, no conclusions can be drawn from this isolated comparison. From the standpoint of mortality, the tuberculosis death rate (after eliminating non-residents, and adding deaths of residents occurring outside of the town) has fallen from 93 per 100,000 in 1917 to 79 in 1918, and to a rate corresponding to 76 for the first five months of 1919. This is an encouraging showing (in view of the fact that the tuberculosis death rate in similar Massachusetts communities has in general materially increased); but again the period is so short and the actual number of deaths so small that no reliable conclusions can be drawn.

DEATH RATE DECREASED

The member of your committee representing statistics (E. T. S.) has prepared a computation of the probable errors involved in the problem and concludes after fitting the rates for 1907-1916 to the curve of probable error, and allowing for the mean error in any given rate projected for 1919-1923, that in order to warrant reasonably safe conclusions one or the other of the following combinations of tuberculosis death rates must be reached during the latter period.

A rate of 30 or less for any 1 year
A rate of 45 or less for any 2 years
A rate of 60 or less for any 3 years
A rate of 75 or less for any 4 years
A rate of 90 or less for all 5 years.

It is obvious that rates between 70 and 80 for 1918 and 1919 cannot possibly be considered as significant, and it could scarcely have been expected in dealing with a disease of the nature of tuberculosis that any conclusive results could be reached in a period so short as three years.

4. *Conclusions in Regard to the Advisability of Continuing the Framingham Demonstration.*

It seems clear that if the Framingham Demonstration should cease on January 1, 1920, the local community will have benefited materially and many important contributions will have been made to the practical control of tuberculosis; but that the main question for which the Demonstration was endowed will remain unanswered. In the judgment of your committee this would be a most unfortunate contingency. Our best authorities on tuber-

BENEFIT TO LOCAL COMMUNITY

culosis have been subject during the past few years to a growing skepticism in regard to the adequacy of methods which have been advocated for the control of this disease and have turned eagerly to the Framingham Demonstration as the first real opportunity to set their doubts at rest. If the Experiment should be abandoned at this time it would be necessary to begin all over again somewhere else, for a test of the best methods now available is absolutely essential for future progress in this field.

If on the other hand it should be possible to continue the Demonstration for a sufficient period to yield results of statistical accuracy, your committee feels confident that the question as to the soundness of the current anti-tuberculosis program will be definitely answered one way or the other. The foundation has been well laid; a program for the control of tuberculosis by early diagnosis and hygienic care has been organized on ideal lines; local sentiment both in medical and lay circles has been successfully developed in support of the campaign; and all conditions are favorable to its success. Given a sufficient period for the continuance of the Demonstration and for the study of the results obtained, both morbidity and mortality records should furnish a clear answer to the question of whether or not such a program is effective.

DEMONSTRATION WILL ANSWER VITAL QUESTIONS

In addition to the fundamental conclusion as to the practicability of the control of tuberculosis by the methods used in Framingham, a continuation of the Demonstration should throw important light upon the theoretic factors which contribute to the development of tuberculosis as a disease, and should therefore make it possible to modify our program along more purposeful lines in the future. The investigations made at Framingham have as yet led to no far-reaching conclusions in regard to these factors. The most suggestive point that has been brought out is perhaps the variation in disease incidence among different race stocks. The combination of a very high proportion of tuberculin reactions with a low mortality among Italians and the precisely opposite condition among persons of Irish race stock is of considerable significance. The study of the subsequent history of the large number of arrested cases now under the observation of the Demonstration constitute, in itself, an invaluable opportunity to determine some of the factors which convert latent into active disease.

RACE STOCK FINDINGS IMPORTANT

In the continuation of the work of the Demonstration, we would urge that special attention be paid to the intensive study of environmental conditions, in the home, the factory, and the community, with a view to throwing more light than has yet been obtained upon the possible effect of each condition upon the spread of tuberculous infection and the development of active disease. We are inclined to believe that the detailed study of even a few hundred cases should yield results of real value in this connection;—if correlated with observation of the environmental conditions surrounding a properly selected control group of families free from tuberculosis.

5. *Recommendations in Regard to the Continuance of the Demonstration in the Future.*

FIVE YEARS EXTENSION NECESSARY

The statistical calculations cited above have led us to the conclusion that the Framingham Demonstration should be continued for a period of at least five years in order to render the attainment of definite results of reasonable certainty. It is, of course, possible that the prolongation of the Demonstration experiment through 1922 might be accompanied by a tuberculosis death rate of 60 or less for all of the three years involved, but since a death rate of 60 corresponds to only 12 deaths, it is obvious that a chance combination of circumstances might easily interfere with such a result. In this contingency we should once more face the possibility that a large sum of money had been spent without the attainment of the primary object in view. The effect of such an experiment should be cumulative, and each year added to its life greatly increases the chances of ultimate success. A five-year period should, we believe, yield results reasonably certain to answer the question as to the practicability of the control of tuberculosis. If successful, it would furnish for the first time a definitely established working program for the practical control of tuberculosis. If unsuccessful, it would indicate with equal clearness the need for the adoption of measures of a different sort from those that have recently been recommended as adequate and necessary.

6. *Suggested Plan for a Five-Year Extension of the Framingham Demonstration.*

INDUSTRIAL MEDICAL WORK ESSENTIAL

In planning for a continuance of the Framingham Demonstration for the purposes indicated in the preceding paragraphs, it seems to your committee best to limit the work somewhat strictly to the definite problem of tuberculosis, and to plan for no new work that does not directly bear upon the fundamental questions involved. It might seem desirable to continue a grant of $2,000 to the Civic League for its general public health work for a period of one year, but this should, in our judgment, cease after 1920, and we feel that the wisdom of continuing to maintain the Day Camp as a part of the Demonstration activity is distinctly problematical. On the other hand, an appropriation for the development of industrial clinics in the smaller manufacturing plants for a period of at least two years seems to us important as a part of the anti-tuberculosis program; and we feel that any plan made should provide for one more general medical examination drive which might profitably be conducted in 1923, leaving 1924 free for the analysis and digestion of the results of the experiment as a whole. The re-examination of individuals already examined in previous drives should prove particularly significant as a measure of the effect of an educational campaign such as that conducted by the Demonstration. On this basis we have prepared a tentative budget, indicating the general lines along which a second appropriation of $100,000.00 might profitably be spent.

$100,000.00 APPROPRIATION RECOMMENDED

The budget* calls for annual expenditures as follows:

1920	$24,600.00
1921	21,600.00
1922	18,800.00
1923	21,700.00
1924	13,300.00
Total	$100,000.00

FURTHER RESEARCH

While an appropriation of $100,000.00 should ensure the successful completion of the primary experiment, it may be pointed out that there are exceptional opportunities for special research in connection with tuberculosis, along such lines as the accumulation of an extensive series of radiographs of contact cases, the intensive study of the relation of race and occupation and home environment to tuberculosis, the study of nutrition as a predisposing factor in tuberculosis, and the like. Additional appropriations for research along such lines could be expended with excellent results at Framingham or elsewhere. It must be remembered that even if the measures used at Framingham should prove definitely successful, they would presumably require to be simplified and made more economical for general use; and the application of research funds in any direction that may lead to such simplification is earnestly to be desired.

7. *Coördination of Existing Health Agencies as a Factor in the Success of the Framingham Demonstration.*

TOWN'S RESPONSE ADMIRABLE

In the main, the town of Framingham has responded with vision and effectiveness to the remarkable opportunities offered by the establishment of the Demonstration. The local Board of Health, the School Committee, the Civic League, and many of the employers of labor have met the challenge to make Framingham the model "Health Town" with constructive responses of a high order. The work of these various agencies has not, however, so far as we can judge, always been coördinated as closely as might be desirable. The Framingham Hospital which directs the district nursing service of the community might play a more active part in the general health campaign than is the case at present, and the great possibilities of service latent in the local Red Cross organization have not been fully utilized.

LOCAL COORDINATION THROUGH HEALTH COUNCIL

It seems to us if the Demonstration is to be continued that it might be of service to organize in Framingham a Health Council which would include

*The proposed annual appropriations were classified according to medical, nursing, research, office and other expenses, and are not given in detail here. This budget was in fact somewhat modified by the National Tuberculosis Association committees, the major expenses being concentrated into an extension period of three years for intensive work, with a smaller appropriation for an additional two-year period for subsequent observation.

the Health Officer or a Board of Health representative as Chairman, with representatives of the School Committee, the Civic League, the Framingham Hospital, the Red Cross, the medical society, and the Demonstration,—this council to serve as a clearing-house for the coördination of health activities and the planning of the most effective public health machinery for the community as a whole.

TRANSFER WORK TO LOCAL AGENCIES

It is obvious that in order to be of general application, the method of control used at Framingham must be susceptible of execution by existing local health agencies and we deem it to be of great importance to enlist the active coöperation of the Health Department, the hospital, and civic bodies, and to transfer the work to them as rapidly as possible; although it seems clear that the observation of results as regards tuberculosis should until 1924 remain in the hands of the officers of the Demonstration. Ultimately a fairly complete degree of consolidation should be attained, particularly in regard to the public health nursing service. Infant welfare nursing, school nursing, tuberculosis nursing, communicable disease nursing and general visiting nursing might, with advantage, be combined under the direction of a nursing director of training and experience.

THIS BOOK IS DUE
MAY 8 3 1968

The Framingham Health Demonstration